

Remarks

Applicants respectfully request reconsideration and withdrawal of the outstanding Office Action rejections in view of the foregoing amendments and following remarks. Claims 16, 22, and 23 have been amended to put the application in better condition for allowance. Claims 18, 19, and 28-39 have been cancelled. No new matter has been added.

Restriction Requirement

The Examiner has required restriction of claims relating to a compound of formula I (claims 16-19), a process for preparing a compound with formula I (claim 20), and an intermediate for the preparation of a compound with formula I (claim 21).

According to the PCT rules, unity of an invention is given if the chemical structures of the intermediates and the final product are technically closely interrelated (see attached copy of PCT Gazette Section IV, No. 24/1996, page 9486). Thus, Applicants maintain that the closely related intermediate of compound I recited in claim 21 and process claim 20 should be rejoined.

Claim Rejections – 35 USC §112

Claims 22-23 are rejected under 35 U.S.C. 112, second paragraph, as being an "intended use" claims. The Examiner asserts that in the absence of a structural difference between the product of the independent claim and that of the dependent claim, said dependent claim is seen to be a substantial duplicate. Claim 22 has been amended to recite "an herbicidal composition comprising a herbicidally effective amount of at least one benzenesulfonamide derivative of the formula I or an agriculturally useful salt of I according to claim 16, and further comprising auxiliaries customary for

formulating crop protection agents". Support for this amendment can be found on page 119, lines 25-36 and page 121, lines 44-45 of the specification. Thus, the claimed composition comprises the compound of formula I in a herbicidally effective amount and further comprises auxiliaries customary for formulating crop protection agents.

Similarly, Claim 23 has been amended to recite "an herbicidal composition comprising a herbicidally effective amount of at least one benzenesulfonamide derivative of the formula I or an agriculturally useful salt of I according to claim 16, and further comprising growth regulating compounds". Support for this amendment can be found on page 122, lines 11-28 of the specification. Thus, the claimed composition comprises the compound of formula I in a herbicidally effective amount and further comprises growth regulating compounds. Applicants submit that there is a structural difference between the product of independent claim 16 (a compound of formula I) and the product of dependent claims 22 and 23 (an herbicidal composition comprising said compound of formula I and further compounds).

Claims 28-39 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for being omnibus type claims. Applicants submit that claims 28-39 have been canceled.

Claims 16-19, 22-23, and 28-39 are rejected under 35 U.S.C. 112, first paragraph, as lacking enablement. Specifically, the Examiner asserts that the specification is only enabling for X^3 being H, or unsubstituted alkyl, R^1 being unsubstituted alkyl, phenyl-C1-C4-alkyl, or unsubstituted cycloalkyl, Q being Q21 and substituents on Q being H, alkyl, haloalkyl, and hydroxyl. Applicants disagree with the Examiner's assertion that the specification is not enabling for R^1 being C_1-C_8 alkoxy or C_1-C_8 alkoxy carbonyl.

Applicants submit that the specification provides enabling disclosure for compounds 3.41 and 3.42 in Table 3 on page 116 containing C₁-C₈ alkoxy carbonyl or C₁-C₈ alkoxy R₁ groups, respectively. These compounds were produced and analyzed as indicated by the melting points reported in Table 3 for each compound. Further, Applicants submit that the specification is also enabling for amino substituents on Q21 (see compounds 1.7-1.11 and 1.19-1.24).

Thus, claim 16 has been amended to include subject matter indicated as enabling by the Examiner and additionally the additional embodiments referred to above.

Applicants submit that claim 16 is presently directed to a compound of formula I wherein

X¹ is hydrogen or halogen;

X² is chlorine;

X³ is hydrogen or C₁-C₆-alkyl,

Y is a group -C(A)B;

A is oxygen;

B is oxygen or sulfur;

R¹ is hydrogen, C₁-C₈-alkyl, C₃-C₇-cycloalkyl, C₁-C₈-alkoxy, phenyl-C₁-C₄ alkyl, wherein C₁-C₈ alkyl may be substituted by C₁-C₈ alkoxy carbonyl.

R²⁹ is hydrogen, C₁-C₆ alkyl, or amino;

R³⁰ is C₁-C₆ haloalkyl;

R³¹ is hydrogen;

or an agriculturally useful salt thereof.

Applicants submit that the presently claimed compound is enabled by the specification and request withdrawal of the rejection under 35 U.S.C. 112, 1st paragraph.

Thus, Applicants tender that all of the rejections under 35 U.S.C. 112 have been obviated as a result of the amendments and request withdrawal of the rejections under 35 U.S.C. 112.

Claim Rejections – 35 USC §103

Claims 16-19, 22-23 and 28-39 are rejected under 35 U.S.C. 103(a) as being obvious over Strunk (U.S. 5,169,430). The Examiner asserts that although the compound of Strunk differs from the instant application at the N-Y- position, an artisan of ordinary skill in the art would be motivated to extend the N-Y- position by one –CH₂ group for a herbicidal use for controlling weeds as disclosed by Strunk.

Attached hereto is a Rule 132 declaration executed by named co-inventor Dr. Robert Reinhard, presenting details distinguishing the present invention from the cited art and describing the problem solved by the present invention. In the Declaration, Dr. Reinhard provides 4 examples comparing the unwanted plant damaging effects of the present compound with compounds A and B of Strunk et al. (US 5,169,430). The test data clearly indicate that the replacement of the alkylcarbonyl-aminosulfonyl side chain of Strunk by an alkoxy carbonyl-aminosulfonyl side chain results in a significantly superior herbicidal activity compared to the compounds known from Strunk et al. Clearly, extension of the side chain of presently claimed compounds produces compounds which are generally similar structurally, but have significantly dissimilar properties. Thus, the presently claimed compounds would not have been expected based on the teachings of the art of record and thus the claims are not rendered

obvious by the art cited in the Office Action. Applicants therefore respectfully request reconsideration and withdrawal of the rejections under 35 U.S.C. §103(a).

Claims 16-19, 22-23, and 28-39 are rejected under 35 U.S.C. 103(a) as being obvious over Andree (U.S. 6,107,252) in view of Strunk (U.S. 5,169,430). Andree discloses a compound substituted by CN at position X2, whereas X2 in the present invention is limited to chlorine. The Examiner asserts that since Strunk discloses a structure where X2 can be cyano or halogen, the combination of Strunk and Andree renders the present invention obvious. Applicants submit that neither Strunk nor Andree discloses a structure within the limitations of the present claims. As is clear from the Declaration executed by Dr. Reinhard, extension of the side chain of the presently claimed compounds produces compounds which are generally similar structurally, but have significantly dissimilar properties. Thus, the presently claimed compounds would not have been expected based on the teachings of the art of record and thus the claims are not rendered obvious over any combination of the art cited in the Office Action. Applicants therefore respectfully request reconsideration and withdrawal of the rejections under 35 U.S.C. §103(a).

In view of the above remarks, claim amendments, and accompanying evidence of unexpected and surprising results, Applicants believe that the rejections set forth in the May 27, 2008 Office Action have been fully overcome and that the present claims fully satisfy the patent statutes. Applicants therefore believe that the application is in condition for allowance. The Examiner is invited to telephone the undersigned if it is deemed to expedite allowance of the application.

Respectfully submitted,

By



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Enclosure: Declaration
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